

Morimoto

164190  
OCT 07 1985

FROM (NAME-LOCATION-PHONE) K. M. Perica, J. F. Queeny Plant, Ext. 1470

DATE : October 2, 1985

SUBJECT : WASTE REDUCTION PROGRAM

REFERENCE :

TO : M. J. Beaudine  
T. E. Greenman  
F. B. Matthews  
C. H. McComb  
J. L. Solari

cc. E. L. Boehm - B2NB  
R. F. Boland  
M. R. Foresman - B3NA  
F. L. Thompson

*Route*  
*Ch Thompson*  
*L J Boesch*  
*was making program*  
*FYI.*

*Done*  
*8/11*  
*10/7*

*1740*  
*Red*  
*1985*

*Elmer*

The plant is on its way to meet the Corporate Environmental Guideline of eliminating the landfiling of waste by January 1, 1986. Of the thirty routinely generated solid wastes, four are now being incinerated. The remainder will be phased in by the end of the year.

One other aspect of this guideline that needs to be addressed is the overall reduction of wastes generated. If you recall, there have been past meetings with MIC and AG Management where this point was discussed. A specific plan must be developed that will demonstrate the reduction of each waste stream. This plan would then become part of a product's manufacturing goals/emphasis areas.

Attached is a list of waste streams for each of your departments along with past generation rates and other pertinent information. This should be helpful in establishing the programs. As was discussed in the Environmental Review last week, we do have some success stories with certain waste streams; these efforts need to be expanded to include all waste streams in the plant.

To streamline these waste reduction efforts I am forming a committee to establish this program on a plantwide basis. Please identify an individual from Production/TSD that will have responsibility in this area by October 11.

If you have any questions, please let me know.

*Ken*  
K. M. Perica

/ad

Attachments

*Good job.*  
*Elmer*

*Done*  
*8/11*  
*10/7*

cc Bob Boland  
Fred Thompson

MCO 6178017

CONFIDENTIAL

T. E. Greenman

TOC Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
PCE Residue	14.6	12.5	12.8	13.6
DMF Solvent	0.63	0.69	1.04	1.39
TOC Floor Sweepings	1.90	1.13	1.56	1.69
DCA Residue	1.29	1.00	1.93	1.66

1. Filtering of the PCPi should result in ~10% reduction in PCE Residue wastes.
2. DMF solvent will eventually disappear as a waste, but it will be replaced with DMSO.

CONFIDENTIAL

MCO 6178016

**CONFIDENTIAL**

T. E. Greenman

Department 50

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Phosphate Ester Cake	0.28	0.28	0.25	0.14
Phosphate Ester Cartridges	0.61	0.66	0.77	0.42
Phenol Residue	9.8	3.2	4.9	6.2

1. On going work with the Task Force should address waste reductions efforts.
2. Dry process was supposed to reduce phenol residue generation.
3. Filter cakes are being evaluated for use in the flooring industry.

CONFIDENTIAL

MCO 6178019

**CONFIDENTIAL**

T. E. Greenman

Aspirin Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Acetic Acid Cartridges	0.03	0.01	0.01	0.02
Aspirin Floor Sweepings	0.14	0.08	0.15	0.26

1. The new vacuum system should reduce the volume of floor sweepings since more material will be recovered.

CONFIDENTIAL

MCO 6178020

**CONFIDENTIAL**

T. E. Greenman

OS Products

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
OS-59A Filter Cake	3.5	5.5	18.3	1.9
OS-140 Filter Cake	3.6	-	1.4	1.4

CONFIDENTIAL

MCO 6178021

**CONFIDENTIAL**

T. E. Greenman

Aroma Esters Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Aroma Filter Cake	0.7	1.6	0.2	0.2

CONFIDENTIAL

MCO 6178022

**CONFIDENTIAL**

F. B. Matthews

Laboratory

<u>Waste Stream</u>	<u>Waste Generation Rate, #/Year</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
General Lab Waste and Glassware	91,000	90,700	88,800	86,400

1. Consider returning samples back to generating department for rework whenever possible.

CONFIDENTIAL

MCO 6178023

**CONFIDENTIAL**

M. J. Beaudine

Central Drumming

<u>Waste Stream</u>	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Filter Cakes	.02	.02	.002	-
Filter Cartridges	.16	.22	.15	.18
Hydraulic Fluid (Off-spec Material)	.27	.26	.12	.24

1. Filter cake stream has been totally eliminated from Central Drumming.
2. Evaluate these hydraulic fluids for potential use or blending operations.

CONFIDENTIAL

MCO 6178024

**CONFIDENTIAL**



C. H. McComb

MALEIC BRIQUETTES DEPARTMENT

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Maleic Floor Sweepings	0.19	0.11	0.11	0.10

1. The department modifications made over the last year should continue to reduce the volume.

CONFIDENTIAL

MCO 6178025

**CONFIDENTIAL**

J. L. Solari

Alachlor Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
AZO Residue	1.6	1.9	1.5	2.5
Alachlor Filter Cartridges	0.001	0.08	0.06	0.05
Molecular Sieves	-	0.07	0.14	0.11
CMA	-	0.03	-	0.06
Others (off spec materials)	-	-	-	0.21

1. AZO Residue is scheduled to be burned at the CAC oxidizer by the end of September, 1985.

CONFIDENTIAL

MCO 6178026

**CONFIDENTIAL**

J. L. Solari

"II" Building

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
PNPT Filter Cartridges	10.04	28.4	8.3	6.3
PNPT Drainings	2.5	-	-	-
PNPT Waste	3.4	10	2.7	0.7
P Phen. Fractions	-	-	2.3	1.3

CONFIDENTIAL

MCO 6178027

**CONFIDENTIAL**

J. L. Solari

TSCL Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
TSCL Residue	8.0	7.7	8.7	7.3
p-TSCL	1.18	0.54	0.48	0.16
TS Amides	0.5	0.34	0.11	0.1

CONFIDENTIAL

MCO 6178028

**CONFIDENTIAL**

J. L. Solari

CAC Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Column Packing	0.19	0.05	-	0.09

CONFIDENTIAL

MCO 6178029

**CONFIDENTIAL**

J. L. Solari

CAC Department

<u>Waste Stream</u>	<u>Waste Generation Rate, #/100 # F.P.</u>			
	<u>1981</u>	<u>1982</u>	<u>1983</u>	<u>1984</u>
Column Packing	0.19	0.05	-	0.09

CONFIDENTIAL

MCO 6178030

**CONFIDENTIAL**